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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO | |
|--|---------------|----------------------|-------------------------|-----------------|--|
| 10/606,229 | 06/26/2003 | Manfred Bohn | 3804.1596-01 | 4228 | |
| 22852 75 | 90 04/07/2006 | | EXAMINER | | |
| FINNEGAN, HENDERSON, FARABOW, GARRETT & DUNNER | | | KIM, VICKIE Y | | |
| LLP 901 NEW YOR | K AVENUE, NW | ART UNIT | PAPER NUMBER | | |
| WASHINGTON, DC 20001-4413 | | | 1618 | | |
| | | | DATE MAILED: 04/07/2006 | | |

Please find below and/or attached an Office communication concerning this application or proceeding.

| | · · · · · · · · · · · · · · · · · · · | | | | | | | | |
|--|---|---|---|--|---------------|--|--|--|--|
| Office Action Summary | | Application | n No. | Applicant(s) | | | | | |
| | | 10/606,22 | 9 | BOHN ET AL. | | | | | |
| | | Examiner | | Art Unit | · | | | | |
| | | Vickie Kim | | 1618 | | | | | |
| Period fo | The MAILING DATE of this communicat or Reply | tion appears on the | cover sheet with the c | orrespondence ac | idress | | | | |
| A SH THE - Exter after - If the - If NC - Failu Any | ORTENED STATUTORY PERIOD FOR MAILING DATE OF THIS COMMUNICA nsions of time may be available under the provisions of 31 SIX (6) MONTHS from the mailing date of this communic period for reply specified above is less than thirty (30) day period for reply is specified above, the maximum statuto re to reply within the set or extended period for reply will, reply received by the Office later than three months after the patent term adjustment. See 37 CFR 1.704(b). | .TION. 7 CFR 1.136(a). In no eve ation. ays, a reply within the statury period will apply and will by statute, cause the appl | init, however, may a reply be tim story minimum of thirty (30) days I expire SIX (6) MONTHS from ication to become ABANDONEI | nely filed s will be considered time the mailing date of this of (35 U.S.C. § 133). | | | | | |
| Status | | | | | | | | | |
| 1) | Responsive to communication(s) filed o | on | | | | | | | |
| 2a) <u></u> □ | This action is FINAL . 2b)⊠ This action is non-final. | | | | | | | | |
| 3) | Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213. | | | | | | | | |
| Dispositi | ion of Claims | | | | | | | | |
| · | | nlication | | | | | | | |
| • | Claim(s) 14-29 is/are pending in the application. | | | | | | | | |
| | 4a) Of the above claim(s) is/are withdrawn from consideration. | | | | | | | | |
| • — | Claim(s) is/are allowed. | | | | | | | | |
| | Claim(s) <u>14-29</u> is/are rejected. | | | | | | | | |
| | ☐ Claim(s) is/are objected to. ☐ Claim(s) are subject to restriction and/or election requirement. | | | | | | | | |
| | · · · — · | Trana/or crection re | squirement. | | | | | | |
| Applicati | ion Papers | , | | | | | | | |
| - | The specification is objected to by the E | | <u></u> | | | | | | |
| 10)☐ The drawing(s) filed on is/are: a)☐ accepted or b)☐ objected to by the Examiner. | | | | | | | | | |
| Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). | | | | | | | | | |
| Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d). | | | | | | | | | |
| 11) | The oath or declaration is objected to by | the Examiner. No | te the attached Office | Action or form P | ΓΟ-152. | | | | |
| Priority (| under 35 U.S.C. § 119 | | | | | | | | |
| a)l | Acknowledgment is made of a claim for All b) Some * c) None of: 1. Certified copies of the priority doc 2. Certified copies of the priority doc 3. Copies of the certified copies of the application from the International Gee the attached detailed Office action for | cuments have bee cuments have bee he priority docume Bureau (PCT Rule | n received. n received in Application ents have been receive e 17.2(a)). | on No. <u>09/07719</u> ed in this National | | | | | |
| | | | | | • | | | | |
| Attachmen | t(s) | | | | | | | | |
| | e of References Cited (PTO-892) | | 4) Interview Summary | | | | | | |
| | e of Draftsperson's Patent Drawing Review (PTO- mation Disclosure Statement(s) (PTO-1449 or PTC | | Paper No(s)/Mail Da 5) Notice of Informal P | | O-152) | | | | |
| | r No(s)/Mail Date | J.30100) | 6) Other: | Transfer de la company de la c | - · / | | | | |

DETAILED ACTION

RCE acknowledged

A request for continued examination(RCE) under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 1/5/2006 has been entered.

Declaration

1. Acknowledgement is made of Declaration filed 1/5/06.

Status of Application

1. The claims 14-29 are pending and presented for the examination.

Claim Rejections - 35 USC 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 14-29 are rejected under 35 U.S.C. 103(a) as being obvious over Dittmar et al(US4,185,106) in view of Squiquera et al(1996,July) and Shoshan (WO96/290455) and Thorel(FR2685867).

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The claims are drawn to a method of treating seborrheic dermatitis using the composition consisting essentially of at least one 1-hydroxy-2-pyridone of general formula I as recited in the claim 14.

US'145 teaches an effective anti-dandruff treatment using a pharmaceutical composition containing 1-hydroxy-2-pyridones (e.g. ciclopirox(1-hydroxy-4-methyl-6-cyclohexyl-2-pyridone) or octopirox(1-hydroxy-4-methyl-6-(2,4,4-trimethyl-pentyl)-2-pyridone)) as active agent, see abstract and col 2.

Applicant's claims differ because they are directed to a method of treating seborrheic dermatitis.

However, it would have been obvious to one of ordinary skill in the art at that time of the invention was made to extend the teaching to include seborrheic dermatitis when Dittmar(US'106) is taken In view of Squiquera et al(1996,July) and Shoshan(WO'455) because latter references remedy the deficiency of Dittma's teaching.

Firstly, Squiquera et al(1996,July) teaches that dandruff has been associated with a local increment in the number of pityrosporum yeasts. Furthermore, antidandruff treatment can be effectively achieved by ciclopirox olamine(OCT) due to its antifungal and antimycotic activitys, see abstract and page 29, 3rd paragraph. Although Squiquera et al(1996,July) does not directly mention that seborrheic dermatitis has been treated with OCT, it does teach seborrheic dermatitis and dandruff is caused by pityrosporum yeasts.

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Second, Shoshan(WO'455) also teaches that dandruff is seborrheic dermatitis of the scalp, and is precursor of alopecia(baldness) and associated with yeast Pityrosporum, see page 1, Ilines 7-17.

Thorel(FR'867) teaches a combination of 1-hydroxy-2-pyridone and undecylenic acid is effectively used in the treatment of dandruff or seborrheic dermatitis secondarily infected by Pityyrosporum.

When these teachings are combined, it is readily apparent that dandruff which is a sign and symptoms of seborrheic dermatitis caused by Pityrosporum yeast. Thus, one would have been motivated to employ 1-hydroxy-2-pyridone to treat seborrheic dermatitis because the efficacy is proven by treating symptoms and also inhibition of causative organism, Pitorosporum yeast. One would have been motivated to choose 1-hydroxy-2-pyridone as a drug of choice because its proven safety and therapeutic efficacy as taught by references mentioned above. Due to the toxicities and difficulties for manufacturing pharmaceutical product which are the main drawback factors associated with other antimycotic, antifungal and antibacterials, one would have been motivated to select 1-hydroxy-2-pyridone for treating seborrheic dermatitits, with reasonable expectation of success.

All other critical elements required by the instant claims are well taught in the cited references and thus, the claimed subject matter is not patentably distinct over the prior art of the record.

One would have been motivated to combine these references and make the modification because they are drawn to same technical fields (constituted with same

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ingredients and share common utilities, and pertinent to the problem which applicant concerns about. MPEP 2141.01(a).

Conclusion

- 3. No claim is allowed. Having carefully reviewed applicants' Request for reconsideration, Applicant's arguments are moot in view of the new ground(s) of rejection.
- 2. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Vickie Kim whose telephone number is 571-272-0579. The examiner can normally be reached on Tuesday-Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Chris Low be reached on 571-272-0616. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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VICKIE KIM
Vickie Kimpy Examiner
Primary Patent Examiner
April 3, 2006
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